Changes since
draft-mortensen-dots-architecture-00

• Document reorganization
• Mitigation request triggers
• Replace DOTS relay with DOTS gateway
• Relayed signaling eliminated
• Clarify use of identifiers to scope mitigation
Document Reorganization

• Rearranged sections for fewer forward references
• Concepts incorporated into Architecture section
Mitigation Request Triggers

- Conditions/motivations for mitigation requests
- Manual
- Threshold-based
- Peer lost
- Not comprehensive, suggestions/criticism welcome
DOTS Gateway

- Logically concatenated DOTS server and client
- Analogous to SIP B2BUA
- No discussion of interface between B2B DOTS server and client
- Replaces DOTS relay
- A function, not a distinct DOTS agent type
DOTS Gateway

DOTS server

DOTS client
Elimination of Relayed Signaling

• All DOTS client/server signaling is bilateral
• Signaling is hop-by-hop, use of gateway is opaque to DOTS clients
• DOTS gateway use is deployment-specific
Problem areas

- Back-to-back DOTS server/client interface
- Multi-homed DOTS clients
- Server discovery
- Redirected signaling
- Recursive signaling
- Authentication and authorization
Open Issues – Server Discovery

- Direct configuration
- DNS SRV?
- DNS TXT
- DNS-SD?
- TBD?
Open Issues —
Multi-homed DOTS client

• Mitigation request from client to multiple DOTS servers
  – Serially
  – In parallel

• How to coordinate server response?
Open Issues — Redirected Signaling

• Currently not in use cases draft
• Design teams seem to agree on value
• Distinction from recursive signaling?
• WG consensus on need to retain this mode?
Open Issues — Recursive Signaling

• Aggregate/propagate/bridge downstream DOTS client request
• Depends on DOTS gateway
• DOTS client visibility into recursive signaling?
• Privacy concerns?
MAAWG discussion

• DOTS presented at MAAWG DDoS SIG meeting in Philadelphia
• Primary concern from attendees: authorization and authentication
Thank you

https://github.com/dotswg/dots-architecture
Appendix: Redirected signaling
Redirected signaling

DOTS client

DOTS server A

DOTS server B
Redirected signaling

DOTS client → Redirect to B → DOTS server A

DOTS server B
Redirected signaling

DOTS client

DOTS server A

DOTS server B